

The frog often moved deep into water but immediately came up to the surface being unable to get rid of its predator. Such movements of the frog continued for 3-4 minutes. The bug, however, struck firmly to the back of the frog and tightened its grip further and further. Ultimately, the frog did not show any sign of movement and floated on the surface of the water while the bug still clung to its back. With the help of a water net both were brought ashore and even during this process the bug did not leave its prey. It was then forcibly removed from the frog, which had by then succumbed. The frog was examined thoroughly and no mark of injury in the form of puncture or otherwise was detected on its body. Even after rigorous squeezing no trace of blood could be detected on any region of body. In all probability the frog was strangled to death by the tight grip of the fore legs of the bug around its gular region.

Distant (1906) mentioned: "Its proboscis is capable of producing a very painful puncture", of which he himself had the experience from the South African giant water bug, *B. niloticum*. On the contrary, *B. indicum* (at least at its nymphal stage) appears not to rely on its proboscis for killing its prey and instead uses its fore pair of raptorial legs for strangling its large vertebrate prey to death.

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8, LINDSAY STREET,
CALCUTTA 16,
December 6, 1972.

S. K. MITRA

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32. DEATH OF CERTAIN INSECTS ON SHRUB *BIDENS PILOSA*

From a survey of literature it appears that not much information is available on insect ecology and associated plants. Recent studies on various groups of life forms including birds (Weed dispersal etc.—Bombay Natural History Society's Seminar on Economic Ornithology) have thrown light on various related factors deserving attention.

During field studies in Dehra Dun a fatal (to insects) relation between a shrub of the family compositae—*Bidens pilosa* Linn. with butterflies, dragonflies and damselflies was observed. The distribution of this shrub is throughout India. It was observed that at the time of seed dehiscence the seed spikes project around the dried flower. At the tip of each seed spike are 1-2 mm V-shaped spines having backwardly directed micro spines. Any winged insect sitting on these is unable to fly off as the recurved spines hook on to its body or wings resulting in the death of the insect thereon. In Dehra Dun region this has been observed along the river Badal in Sahasdhara Hills and in Siwalik forests where often quite a few insects are seen dead on this shrub. However, there is no carnivorous relationship between the plant and the insects.

Incidentally it may be pointed out that it is this plant whose spikes are often found stuck on clothing during trek in the forests.

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30-SOUTH PATEL NAGAR,
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R. K. BHATNAGAR

33. NOMENCLATURAL NOTE ON *MIMUSOPS ELENGI* LINN.

In view of the taxonomic studies carried out by Lam (1925, 1927, 1932) and Van Royen (1952) on the genus *Mimusops* Linn., it has become necessary to put forward this note for the benefit of Indian botanists.

Van Royen (1952) considers *Mimusops elengi* Linn. an extremely variable species thereby leaving no room for distinguishing varieties or forms of Lam. But in the western parts of the Archipelago the leaves are larger up to 18 cm long and towards the east these decrease in size to 6 cm length, ending in the smaller leaves of *Mimusops parvifolia* R. Br.

The synonymy, in detail, is as follows:

Mimusops elengi Linn. Sp. Pl. 349, 1753; Lam in Bull. Jard. Bot. Bzg, sér. 3, 7:234, 1925; sér. 3, 8:479-480, 1927; and in Nova Guinea 14, 4:568, 1932; Van Royen in Blumea 6(3):594, 1952.

M. parvifolia R. Br. Prodr. 531, 1810; Lam in Bull. Jard. Bot. Bzg, sér. 3, 7:235, 1925.